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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/567,988

05/06/2008

Ove Charles Volstad

1935-00179

7505

26753

7590

10/12/2011

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EXAMINER

KAMPS, FRANCES H

ART UNIT

PAPER NUMBER

3749

MAIL DATE

DELIVERY MODE

10/12/2011

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/567,988

Applicant(s)

VOLSTAD, OVE CHARLES

Examiner

FRANCES H. KAMPS

Art Unit

3749

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 06 May 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on ____; the restriction requirement and election have been incorporated into this action.
- 4) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 5) ☒ Claim(s) 1-4 is/are pending in the application.
- 5a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 6) ☐ Claim(s) ____ is/are allowed.
- 7) ☒ Claim(s) 1-4 is/are rejected.
- 8) ☐ Claim(s) ____ is/are objected to.
- 9) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 10) ☐ The specification is objected to by the Examiner.
- 11) ☒ The drawing(s) filed on 10 February 2006 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 12) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-940)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 05/06/08.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date ____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: ____

DETAILED ACTION

Drawing Objections

1. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the "connection (28)" must be shown *clearly* or the feature canceled from the claim. No new matter should be entered.
2. Please refer to Claim Rejections - 35 USC § 112, below.
3. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.
4. Appropriate correction is required.

Claim Rejections - 35 USC § 112

5. The following is a quotation of the second paragraph of 35 U.S.C. § 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. **Claims 1 - 4 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.**

7. **In re claim 1:**

- The phrase "for example" renders the claim indefinite because it is unclear whether the limitation(s) following the phrase are part of the claimed invention. See MPEP § 2173.05(d). For the purpose of examination, that phrase will be removed from the claim.
- The term "the outlet" lacks antecedent basis. For the purpose of examination, the limitation has been understood to mean "an outlet".

8. **In re claim 2:**

- The phrase "preferably" renders the claim indefinite because it is unclear whether the limitations following the phrase are part of the claimed invention. See MPEP § 2173.05(d). For the purpose of examination, that phrase will be removed from the claim.
- The term "the intermediate corrugated layer" lacks antecedent basis. Similarly, "the plate" lacks antecedent basis. For the purpose of examination, the limitation has been understood to mean "an intermediate corrugated layer", and "the intermediate corrugated layer" respectively.
- The term "connection" is not described in the specification in a manner that makes it clear what feature is being invoked. For the purpose of examination, this limitation is being interpreted as best understood as a *fluid* connection (i.e. a hole).

Claim Rejections - 35 USC § 102 / 103

9. The following is a quotation of the appropriate paragraphs of 35 U.S.C. § 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

10. **Claims 1 and 2 are rejected under 35 U.S.C. § 102(b) as being anticipated by Volstad et al (WO99/63179).**

11. **In re claim 1**, Volstad et al ('179) discloses a device (fig 1) in a constructional element which may form a supporting element (1), for temperature regulation in, for example, storey partitioning elements (pg 3, ln 1), walls and ceilings of a building structure or a refrigerating plant (pg 4, ln 6), in which

- the temperature-regulating surfaces of the constructional element are formed by two or more corrugated cavity-forming layers (2, 3, 4),
- the cavities being connected to an outlet and inlet, respectively, of a heating/cooling unit and being arranged to circulate temperature-regulated air*,
- characterized in that the temperature-regulating surfaces are provided with perforations ((6) pg 4, ln 31).

12. * Volstad et al ('179) discloses that cavity forming layers may be utilized for heating and/or cooling rooms in a building (pg 3, lns 5, 6) and the layers are to carry air "in a controlled manner" (pg 5, ln 5), suggesting that the layers are connected to a heating / cooling unit. Furthermore, at least from the suggestion that the cavities are connected to a heating / cooling unit, it can be reasonably assumed that they form part of a circuitous air passage (i.e. are connected to an inlet and an outlet of the heating / cooling unit). However, inasmuch as Volstad et al ('179) does not explicitly disclose these aspects, Claim 1 is additionally rejected under 35 USC 103:

13. Erikson et al (US 3,688,983) discloses a circuitous air passage for a structure (figs 1, 8) connected to a heating / cooling unit (64), in which the air passages are routed through the ceiling structure (fig 4) and are connected to an outlet (100, 102) and inlet (104) of the heating/cooling unit and being arranged to circulate temperature-regulated air (Abstract; col 4, lns 39, 40)).

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14. It would have been obvious to a person having ordinary skill in the art at the time the invention was made to modify the system of Volstad et al ('179) as taught by Erikson et al ('983), to provide a heating/cooling unit wherein the cavities being connected to an outlet and inlet, to efficiently condition the building structure.

15. **In re claim 2**, Volstad et al ('179) discloses wherein, in the portion of the intermediate corrugated layer (3), there is arranged at least one connection (6) between the two sides of the plate.

Claim Rejections - 35 USC § 103

16. The following is a quotation of 35 U.S.C. § 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

17. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. § 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. § 103(c) and potential 35 U.S.C. § 102(e), (f) or (g) prior art under 35 U.S.C. § 103(a).

18. **Claims 3 and 4 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Volstad et al (WO99/63179), in view of Erikson et al (US 3,688,983).**

19. **In re claim 3**, the proposed combination has been discussed, but is silent as to the material of the inner plate.

20. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to form the inner plate by a porous constructional element, since it has been held to

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be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious design choice. *In re Leshin*, 125 USPQ 416.

21. **In re claim 4**, see above, (in re claim 3).

Conclusion

22. The prior art made of record, not relied upon, and yet is considered pertinent to applicant's disclosure can be found in the PTO- 892, Notice of References Cited.

23. Any inquiry concerning this communication or earlier communications from the examiner should be directed to FRANCES KAMPS whose telephone number is 571.270.5726. The examiner can normally be reached on M-F; 8-5.

24. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Steve McAllister can be reached on 571.272.6785. The fax phone number for the organization where this application or proceeding is assigned is 571.273.8300.

25. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866.217.9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800.786.9199 (IN USA OR CANADA) or 571.272.1000.

/FRANCES KAMPS/
Examiner, Art Unit 3749

/STEVEN B. MCALLISTER/
Supervisory Patent Examiner, Art Unit 3749